

COUNTING ROOM TECHNICIAN JOB PERFORMANCE MEASURE

TASK CODE: CRT-D02

TASK: Perform Proportional Counter Preoperational Checks

NAME: _____ **SSN:** _____

REFERENCES:

1. WP 12-RL1300, Operation of Canberra 2404 Alpha/Beta Counting System
2. WP 12-RL1340, Operation of Tennelec LB4100 Gross Alpha/Beta Counting System
3. WP 12-RL1320, Radioactive Source Control

TERMINAL OBJECTIVE:

Given a gross alpha/beta counting system, perform the preoperational checks per WP 12RL1300 and WP 12-RL1340.

CONSEQUENCES OF INADEQUATE PERFORMANCE:

Improper sample analysis
Component damage

HAZARDS (PERSONNEL/EQUIPMENT STATUS):

None

PRE-REQUISITE TRAINING/ TASK COMPLETION:

1. CF 3.00 Series
2. CRT-A12, Manage Samples

TOOLS/EQUIPMENT (MATERIALS REQUIRED):

1. Canberra Alpha/Beta Counting System
2. Tennelec Gross Alpha/Beta Counting System
3. System Logbook
4. Radioactive Sources
5. Tweezers

Instructions to Trainee: You shall acquire the necessary references and equipment, and complete all required documentation. Knowledge requirements shall be completed with 80% or greater accuracy. Critical step performance shall be completed with 100% accuracy.

Instructions to JPM Evaluator: The trainee is to perform the terminal objective, without assistance, on the job site. Provide clarification of requirements if requested by the trainee. You are encouraged to ask relevant questions to verify trainee understanding. If the trainee fails this JPM, clearly document the reason for failure and forward to the trainee's manager. Successful completion of this JPM shall be recorded on the trainee's qualification card.

KNOWLEDGE REQUIREMENTS:

Reference	Knowledge Requirement	Pass/Fail
3	State the precautions associated with handling radioactive sources.	
1	Canberra 2404 Alpha/Beta Counting System	
1	Discuss the procedural precautions, limitations and prerequisites.	
1	State the type of detector this instrument utilizes.	
1	State the purpose of P-10 Gas.	
1	State the purpose of a Performance Check.	
2	Tennelec LB4100 Gross Alpha/Beta Counting System	
2	Discuss the procedural precautions, limitations and prerequisites.	
2	State the type of detector this instrument utilizes.	
2	State the purpose of a Preoperational Background Check.	
2	State the purpose of a Preoperational Efficiency Check.	

PERFORMANCE REQUIREMENTS:

Reference	Performance Requirement	Pass/Fail
1	Canberra 2404 Alpha/Beta Counting System	
3	Obtain and check out the required radioactive source.#	
1	Verify all procedural precautions, limitations and prerequisites have been met.#	
1	Verify the system is currently calibrated.#	

1	Perform the Performance check.#	
Reference	Performance Requirement	Pass/Fail
1	Document the completion of the Performance Check.#	
2	Tennelec LB4100 Gross Alpha/Beta Counting System	
2	Obtain and check out the required radioactive source.#	
2	Verify all procedural precautions, limitations and prerequisites have been met.#	
2	Verify the system is currently calibrated.#	
2	Perform the Preoperational Background Check.#	
2	Perform the Preoperational Efficiency Check.#	
2	Document the completion of the preoperational checks.#	

indicates a critical step

FINAL EVALUATION:

PASS

FAIL

COMMENTS:

EVALUATOR SIGNATURE:

DATE:_____

TRAINEE SIGNATURE:

DATE:_____

MANAGER SIGNATURE:

DATE:_____